

DEPARTMENT OF TRANSPORTATION

DIVISION OF ENGINEERING SERVICES

Office of Structural Materials

Quality Assurance and Source Inspection



Bay Area Branch

690 Walnut Ave.St. 150

Vallejo, CA 94592-1133

(707) 649-5453

(707) 649-5493

Contract #: 04-0120F4Cty: SF/ALA Rte: 80 PM: 13.2/13.9File #: 69.28**WELDING INSPECTION REPORT****Resident Engineer:**Pursell, Gary**Address:** 333 Burma Road**City:** Oakland, CA 94607**Report No:** WIR-008921**Date Inspected:** 17-Sep-2009**Project Name:** SAS Superstructure**OSM Arrival Time:** 700**Prime Contractor:** American Bridge/Fluor Enterprises, a JV**OSM Departure Time:** 1900**Contractor:** Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Shanghai, China**CWI Name:** Chen Xi**CWI Present:** Yes No**Inspected CWI report:** Yes No N/A**Rod Oven in Use:** Yes No N/A**Electrode to specification:** Yes No N/A**Weld Procedures Followed:** Yes No N/A**Qualified Welders:** Yes No N/A**Verified Joint Fit-up:** Yes No N/A**Approved Drawings:** Yes No N/A**Approved WPS:** Yes No N/A**Delayed / Cancelled:** Yes No N/A**Bridge No:** 34-0006**Component:** OBG Crossbeams**Summary of Items Observed:**

On this day CALTRANS OSM Quality Assurance Inspector (QA) Steve Hall was present during the times noted above for observations relative to the fabrication of the SAS Superstructure being performed by Zhenhua Port Machinery Company (ZPMC) at Changxing Island, in Shanghai, China. QA observed and/or found the following:

OBG CROSS BEAM CB1

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB2

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB3

This crossbeam has been loaded on the ship.

OBG CROSS BEAM CB4

WELDING INSPECTION REPORT

(Continued Page 2 of 5)

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB5

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB6

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB7

This QA observed ZPMC personnel trimming the stock material off of the deck, side and bottom panels on the north and south ends of this crossbeam. QA noted that the worker was using automated, gear driven thermal cutting equipment. No other significant work was observed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB8

During random in process inspection of this crossbeam this QA observed several cope holes in the floor beam diaphragms and various welds that do not appear to comply with the contract documents. Fabrication of this crossbeam is still in process and has not yet been released to QA for final inspection. This QA marked the areas in question for the contractors QC to inspect and evaluate. The attached photos of these discrepancies are intended to capture the in-process workmanship being performed on this component.

OBG CROSS BEAM CB9

This QA observed ZPMC qualified welding personnel identified as 220688 perform FCAW welding on weld joint identified as CB202A-009-002. ZPMC QC identified as Mr. Liu Cheung Gang was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-T-2232-Tc-U4b-F.

This QA observed ZPMC qualified welding personnel identified as 048625 perform FCAW welding on weld joint identified as CB202A-009-008. ZPMC QC identified as Mr. Liu Cheung Gang was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-T-2132.

This QA observed ZPMC qualified welding personnel identified as 070007 perform SMAW welding on weld joint identified as CB202G-023-146. ZPMC QC identified as Mr. Liu Cheung Gang was present to monitor the welding process. The welding parameters as measured using QC's calibrated instruments appeared to be in general compliance with WPS-B-P-2113.

OBG CROSS BEAM CB10

WELDING INSPECTION REPORT

(Continued Page 3 of 5)

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB11

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB12

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB13

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB14

During random in process inspection of the joint fit up of this crossbeam this QA observed that at least one tack weld at joint identified as CB202G-044-057 did not appear to comply with the contract documents. This QA informed ZPMC QC inspectors of the deficient tack weld. The QC inspectors concurred with QA and instructed the workers in the area to grind the tack and re-tack the joint prior to welding. This tack weld had not yet been repaired prior to QA departing the area. The attached photo of this tack weld is intended to capture the in-process workmanship being performed on this component.

No significant work was observed on this crossbeam during the time QA was present.

OBG CROSS BEAM CB15

This QA observed ZPMC personnel fitting floor beam sections to the side panels of this crossbeam. No other significant work was observed on this crossbeam during the time QA was present.

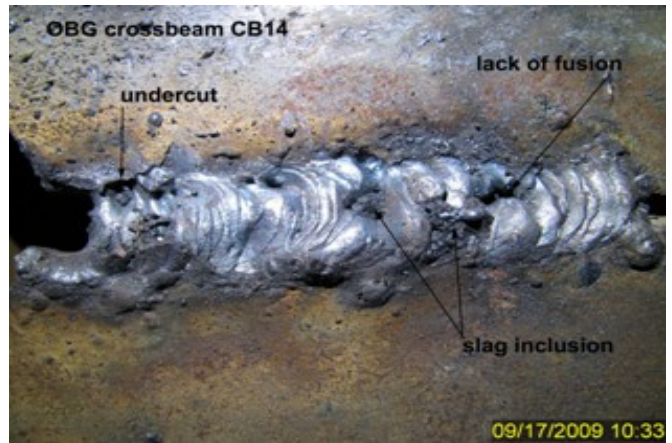
OBG CROSS BEAM CB16

This QA observed that no significant work was being performed on this crossbeam during the time QA was present.

Unless otherwise noted, all work observed on this date appeared to be in general compliance with the applicable contract documents.

WELDING INSPECTION REPORT

(Continued Page 4 of 5)



WELDING INSPECTION REPORT

(Continued Page 5 of 5)



Summary of Conversations:

As mentioned above.

Comments

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Eric Tsang (15000422372), who represents the Office of Structural Materials for your project.

Inspected By:	Hall,Steven	Quality Assurance Inspector
Reviewed By:	Prue,Erik	QA Reviewer
